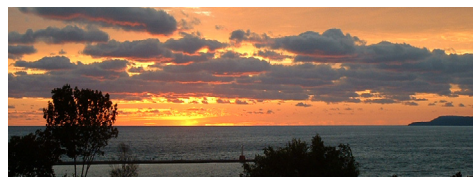
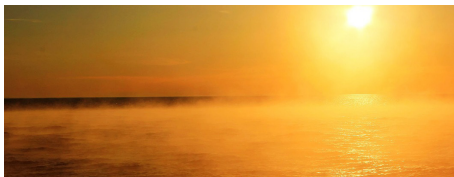
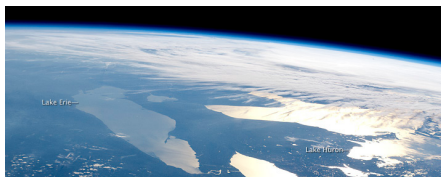


Great Lakes Restoration Initiative

Conservation Beyond Boundaries **GLRI**



Overview

The Great Lakes — Erie, Huron, Michigan, Ontario, and Superior — contain over 20 percent of the world's fresh water. Millions of people rely on the Great Lakes for drinking water and recreation; they also provide valuable fish and wildlife habitat. NRCS does this by supporting farmers' use of scientifically proven conservation practices that reduce or prevent excess phosphorus from entering into nearby rivers and streams.

The Great Lakes are highly sensitive to biological and chemical stresses, including habitat destruction from development and urban sprawl, pollution from sewage and industrial sources, and nutrients and sediment from agricultural land. Excess phosphorus allows large algae blooms — toxic and non-toxic — to thrive on the surface of several Great Lakes, including western Lake Erie, Lake Michigan and Lake Huron. Invasive fish, such as Asian carp, and plant species, such as phragmites, also threaten the Great Lakes ecosystem.

Priorities

USDA's Natural Resources Conservation Service (NRCS) is contributing toward the overall Great Lakes restoration effort through the Great Lakes Restoration

Initiative (GLRI). GLRI aims to protect water quality and reduce nonpoint source pollution, combat invasive species, restore wetlands and other critical habitat and encourage farmers to use scientifically proven conservation practices that reduce or prevent excess phosphorus from entering into nearby rivers and streams.

Funding Source

Environmental Quality Incentives Program (EQIP)

Results

In fiscal year 2014, NRCS received \$23.2 million through an interagency agreement with the U.S. Environmental Protection Agency to target conservation efforts through GLRI in selected priority areas. Since then, producers have signed 311 contracts worth \$13.3 million to implement conservation practices on their agricultural land.

Producers in these priority watersheds implemented scientifically proven conservation practices to improve water quality, eliminate invasive species, and enhance wildlife habitat. The additional funding allowed NRCS and its partners to provide financial and technical assistance to private landowners beyond normal Farm Bill program funding.

GLRI has been very successful in accelerating water quality improvements in the most vulnerable areas of the Great Lakes. Farmers have used these GLRI funds to implement conservation practices on more than 287,000 acres, voluntarily putting conservation practices in critical sub-watersheds that will have the greatest impact in reducing pollution.



Conservation practices like no till and residue management help improve water quality downstream.

Feature Story

Conservation-minded Farm Family Works with NRCS to Help Clean Lake Erie

The residents of Putnam County, Ohio understand the dynamics of water. The county lies in the western reaches of the Maumee River watershed, a 4.5 million acre area that drains into Lake Erie. In August 2007, the skies opened, dropping more than a foot of rain in less than a week. Putnam County was hit the hardest, recording 8 inches of rain in 48 hours. It was the worst flood experienced by residents in nearly 100 years.

Gerald and Cheryl Whipple grow row crops and wheat on their 338-acre farm in Putnam County, as did Gerald's father and grandfather. Gerald attributes his conservation ethic to these men, who put in filter strips along the creek over 50 years ago, where they continue to improve water quality to this day.

The Whipples plan for conservation just as they plan for their crops, as an integral part of the whole farm plan. In this part of Ohio, managing the land for drainage can make the difference between success and failure in any given year. The rich, fertile topsoil built up over centuries can wash away in hours in years like 2007. Fertilizer, like phosphorous, often washes with soil. This phosphorus fuels algal growth, a critical problem plaguing Lake Erie. Gerald Whipple understands that conservation-minded farming benefits his bottom line, as well as the health of the people who rely on drinking water pumped from Lake Erie.

The Whipple's conservation system protects and improves his soil, minimizes the use of costly fertilizers and pesticides, and provides his crops resiliency to extreme weather, like floods and droughts. It includes no-till, soil testing, fertility mapping and yield monitoring, and variable rate fertilizer application technology.

To reduce erosion and sedimentation, they installed grass waterways and grade stabilization structures. Through GLRI, they have planted over 170 acres of cover crops, using seed he had grown on the farm.

Whipple attributes increased soil organic matter and decreased use of herbicides to cover crops, explaining the cover crops minimize weed growth. Their land stewardship ethic extends beyond their farm operation; the Whipples share their experiences with others in the community through service on the Putnam County Soil and Water Conservation District, which Gerald chairs.

They also host field days and events, and speak to groups about conservation on their farm. For all of these reasons and more, the Ohio Farmer selected the Whipple's as one of five families for their 2014 Conservation Farm Family Award.



Gerald and Cheryl Whipple (second and third from left) receive the Ohio Farm Family Award plaque from Ohio Department of Natural Resources Director Jim Zehringer at a ceremony at the Farm Science Review in London, Ohio.

Fiscal Year 2014 Great Lakes Restoration Initiative
NRCS Financial Assistance (FA) Active and Completed Contracts

	Contracts	Obligations	Acres
Illinois*	0	\$0	0.0
Indiana	26	\$456,405	2,142.1
Michigan	96	\$4,463,326	21,156.4
Minnesota	32	\$170,941	5,167.2
New York	12	\$875,237	1,474.2
Ohio	59	\$3,171,391	11,222.3
Pennsylvania	1	\$85,011	128.3
Wisconsin	85	\$4,091,974	10,271.7
Total	311	\$13,314,285	51,562.2

* Data sources: NRCS Resource Economics Analysis and Policy Division and Protracts, January 2015.

* Illinois has a small area of urban shoreline that is part of GLRI. Projects are funded in previous years there.